

APPENDIX

Fig. [1C] 2 illustrates a prior art remote management configuration for the computer system 100. A motherboard 101 provides structural and base electrical support for the south bridge 112, the PCI bus 110, the PCI connector 111, the SMBus 115, and sensors 103A and 103B. The NIC 109, a removable add-in card, couples to the motherboard 101, the PCI bus 110, and the SMBus 115 through the PCI connector 111. The NIC 109 includes an Ethernet controller 105 and an ASF microcontroller 107. The Ethernet controller 105 communicates with a remote management server 90, passing management data and commands between the ASF microcontroller 107 and the remote management server 90. The remote management server 90 is external to the computer system 100.

The invention may be understood by reference to the following description taken in conjunction with the accompanying drawings, in which like reference numerals identify similar elements, and in which:

Fig. 1A illustrates a block diagram of a prior art computer system[, and Fig. 1B illustrates a block diagram of a prior art south bridge[, and Fig. 1C illustrates a prior art remote management arrangement];

Fig. 2 illustrates a prior art remote management arrangement;

Figs. [2A and 2B] 3A and 3B illustrate block diagrams of embodiments of computer systems having remote management arrangements, according to various aspects of the present invention;

Fig. [3] 4 illustrates a block diagram of an embodiment of an ASF south bridge including integrated ASF, ACPI, and/or Ethernet capabilities, according to various aspects of the present invention;

Fig. [4] 5 illustrates a block diagram of an embodiment of the ASF south bridge including ASF registers in the RTC battery well of the ASF south bridge, according to various aspects of the present invention;

Fig. 6 illustrates a flowchart an embodiment of a method for booting a computer system including the ASF south bridge of Fig. 4, according to one aspect of the present invention;

Figs. 7A and 7B illustrate flowcharts of embodiments of method for operating a computer system including the ASF south bridge of Fig. 4, according to various aspects of the present invention;

Fig. 7C illustrates a block diagram of a polling engine that may be employed in the computer system of Figs. 3A and 3B, according to various aspects of the present invention;

Fig. 7D illustrates an exemplary address table that may be employed by the pollin engine of Fig. 7C, according to various aspects of the present invention;

Figure 8 illustrates a block diagram of a south bridge that may employed in the computer system of Figs. 3A and 3B, according to various aspects of the present invention;

Figure 9 illustrates a flow diagram of a master control loop that may be employed in the computer system of Figs. 3A and 3B, according to various aspects of the present invention

Figure 10 depicts a flow diagram of an interrupt service routine that may be employed with the master control loop of Figure 9, according to various aspects of the present invention

Figure 11 illustrates a flow diagram of an alternative embodiment of the mater control loop of Figure 9, according to various aspects of the present invention; and

Figure 12 depicts a flow diagram of an interrupt service routine that may be employed with the master control loop of Figure 11, according to various aspects of the present invention.

While the invention is susceptible to various modifications and alternative forms, specific embodiments thereof have been shown by way of example in the drawings and are herein described in detail. It should be understood, however, that the description herein of specific embodiments is not intended to limit the invention to the particular forms disclosed, but on the

contrary, the intention is to cover all modifications, equivalents, and alternatives falling within the spirit and scope of the invention as defined by the appended claims.